

Listing of Claims:

This listing of claims will replace all prior versions and listings of claims in the prior application:

1. (currently amended) An isolated, attenuated viral strain of human parainfluenza virus 2, wherein the viral strain is temperature sensitive and cold adapted.
2. (currently amended) The isolated, attenuated viral strain of claim 1 which exhibits titers in plaque assays on Vero cells when grown at around 32 °C in a mammalian host cell which are less than about 100 times its titer when grown at around 23 °C in the mammalian host cell, and which ~~is less~~ are greater than or equal to about 100 times its titer when grown at around 39 °C in the mammalian host cell.
3. (original) The isolated, attenuated viral strain of claim 1 which exhibits titers in plaque assays on Vero cells when grown at around 39 °C in the mammalian host cell which are less than or equal to about 1.0 pfu/ml.
4. (previously presented) The isolated, attenuated viral strain of claim 1 which is selected from the group of viral strains consisting of those designated C3464, C3490, C3605, and subclones or progeny of any of the aforementioned strains.
5. (canceled)

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8. (original) A vaccine composition comprising the isolated, attenuated viral strain of claim 1 and a pharmaceutically acceptable carrier.

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6. (original) The vaccine composition of claim 8 further comprising a pharmaceutically acceptable excipient.

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8. (original) The vaccine composition of claim 6 further comprising a pharmaceutically acceptable adjuvant.

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9. (currently amended) The vaccine composition of claim 6 wherein the isolated, attenuated viral strain is the strain of claim 2 exhibits titers in plaque assays on Vero cells when grown at around 32°C in a mammalian host cell which are less than about 100 times its titer when grown at around 23°C in the mammalian host cell, and which are greater than or equal to about 100 times its titer when grown at around 39°C in the mammalian host cell.

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10. (original) The vaccine composition of claim 9 further comprising a pharmaceutically acceptable excipient.

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11. (original) The vaccine composition of claim 9 further comprising a pharmaceutically acceptable adjuvant.

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12. (currently amended) The vaccine composition of claim 6 wherein the isolated, attenuated viral strain is the strain of claim 4 selected from the group of viral strains consisting of those designated C3464, C3490, C3605, and subclones or progeny of any of the aforementioned strains.

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13. (original) The vaccine composition of claim 12 further comprising a pharmaceutically acceptable excipient.

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14. (original) The vaccine composition of claim 12 further comprising a pharmaceutically acceptable adjuvant.

15. (canceled)

16. (canceled)

17. (canceled)

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18. (original) A method of inducing a protective immune response in a mammal comprising administering to the mammal an amount of the isolated, attenuated viral strain of claim 1 sufficient to elicit the protective immune response.

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19. (currently amended) The method of claim 18 wherein the isolated, attenuated viral strain is the strain of claim 2 exhibits titers in plaque assays on Vero cells when grown at around 32°C in a mammalian host cell which are less than about 100 times its titer when grown at around 23°C in the mammalian host cell, and which are greater than or equal to about 100 times its titer when grown at around 39°C in the mammalian host cell.

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20. (currently amended) The method of claim 18 wherein the isolated, attenuated viral strain is the strain of claim 3 exhibits titers in plaque assays on Vero cells when grown at around 39°C in the mammalian host cell which are less than or equal to about 1.0 pfu/ml.

17 21. (currently amended) The method of claim 18 wherein the isolated, attenuated viral strain is the strain of claim 4 <sup>14</sup>  
selected from the group of viral strains consisting of those  
designated C3464, C3490, C3605, and subclones or progeny of any  
of the aforementioned strains.

22. (canceled)

18 23. (new) The isolated, attenuated viral strain of claim 1, wherein the viral strain is produced by a method comprising the steps of:

- (a) culturing in vitro a wild type human parainfluenza virus 2 (HPIV-2);
- (b) cold passaging said virus at a first temperature;
- (c) selecting viruses that grow at the first temperature;
- (d) cold passaging the selected viruses at a second temperature, the second temperature being less than the first; and
- (e) selecting viruses that grow at the second temperature.

19 24. (new) The isolated, attenuated viral strain of claim 23, <sup>18</sup> further comprising the steps of:

- (f) cold passaging the selected viruses at a third temperature, the third temperature being less than the second; and
- (g) selecting viruses that grow at the third temperature.

20 25. (new) The isolated, attenuated viral strain of claim 24, <sup>19</sup> further comprising the steps of:

(h) cold passaging the selected viruses at a fourth temperature, the fourth temperature being less than the third; and

(i) selecting viruses that grow at the fourth temperature.

21 26. (new) The isolated, attenuated viral strain of claim 23, wherein the virus is passaged and selected more than once at each temperature. <sup>18</sup>

22 27. (new) The isolated, attenuated viral strain of claim 25, wherein the virus is passaged and selected more than once at each temperature. <sup>20</sup>

23 28. (new) The isolated, attenuated viral strain of claim 27, wherein the viruses are passaged at a first temperature of about 30°C, at a second temperature of about 28°C, at a third temperature of about 26°C, and at a fourth temperature of about 24°C. <sup>22</sup>

24 29. (new) The isolated, attenuated viral strain of claims 28, wherein the viruses are passaged six times at 30°C, six times at 28°C, eight times at 26°C and thirteen times at 24°C. <sup>23</sup>

25 30. (new) A vaccine composition comprising the isolated, attenuated viral strain of claim 23 and a pharmaceutically acceptable carrier. <sup>18</sup>

26 31. (new) A vaccine composition comprising the isolated, attenuated viral strain of claim 25 and a pharmaceutically acceptable carrier. <sup>20</sup>

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32. (new) A method of inducing a protective immune response in a mammal comprising administering to the mammal an amount of the isolated, attenuated viral strain of claim 23 <sup>18</sup> sufficient to elicit the protective immune response.

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33. (new) A method of inducing a protective immune response in a mammal comprising administering to the mammal an amount of the isolated, attenuated viral strain of claim 25 <sup>26</sup> sufficient to elicit the protective immune response.

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34. (new) A method of producing an isolated, attenuated viral strain of human parainfluenza virus 2, wherein the viral strain is temperature sensitive and cold adapted, the method comprising the steps of:

- (a) culturing in vitro a wild type human parainfluenza virus 2 (HPIV-2);
- (b) cold passaging said virus at a first temperature;
- (c) selecting viruses that grow at the first temperature;
- (d) cold passaging the selected viruses at a second temperature, the second temperature being less than the first; and
- (e) selecting viruses that grow at the second temperature.

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35. (new) The method according to claim 34, <sup>29</sup> further comprising the steps of:

- (f) cold passaging the selected viruses at a third temperature, the third temperature being less than the second; and
- (g) selecting viruses that grow at the third temperature.

31 26. (new) The method according to claim 35, further comprising  
the steps of:

(h) cold passaging the selected viruses at a fourth  
temperature, the fourth temperature being less than the  
third; and

(i) selecting viruses that grow at the fourth temperature.

32 27. (new) The method according to claim 34, wherein the virus  
is passaged and selected more than once at each temperature.

33 28. (new) The method according to claim 36, wherein the virus  
is passaged and selected more than once at each temperature.

34 29. (new) The method according to claim 38, wherein the viruses  
are passaged at a first temperature of about 30°C, at a second  
temperature of about 28°C, at a third temperature of about 26°C,  
and at a fourth temperature of about 24°C.

35 30. (new) The method according to claim 39, wherein the viruses  
are passaged six times at 30°C, six times at 28°C, eight times at  
26°C and thirteen times at 24°C.

36 31. (new) The method according to claim 40, wherein the  
isolated, attenuated viral strain exhibits titers in plaque  
assays on Vero cells when grown at around 32°C in a mammalian  
host cell which are less than about 100 times its titre when  
grown at around 23°C in the mammalian host cell, and which are  
greater than or equal to about 100 times its titre when grown at  
around 39°C in the mammalian host cell.

~~37~~ <sup>36</sup> 42. (new) The method according to claim ~~41~~, wherein the isolated attenuated viral strain exhibits titers in plaque assays on Vero cells when grown at around 39°C in the mammalian host cell which are less than or equal to about 1.0 pfu/ml.